

WHAT IS CLAIMED IS:

1. A floor cleaning tool comprising:

a housing of which a bottom side is adapted to face a floor;

a support element that is mounted to said housing and protrudes downwardly from said housing so as to contact on the floor and exert a first portion of a total contact force of said floor cleaning tool on the floor;

a power-driven rotatable brush roller that is rotatably mounted in said housing and exposed downwardly from said housing toward the floor;

a pivot lever that has a pivot point pivotally connected to said housing;

an adjusting element that is supported by and connected to a mounting point on said pivot lever displaced away from said pivot point of said pivot lever; and

a biasing spring that is connected to said housing and to a spring connection point on said pivot lever displaced away from said pivot point of said pivot lever;

wherein said biasing spring exerts a biasing force that biases said pivot lever to pivot about said pivot point so as to move said adjusting element out of said housing to contact on the floor and exert a second portion of the total contact force of said floor cleaning tool on the floor.

1     **2.**     The floor cleaning tool according to claim 1, wherein said  
2             brush roller selectively contacts on the floor and exerts  
3             a third portion of the total contact force of said floor  
4             cleaning tool on the floor, wherein said third portion is  
5             dependent on said second portion so as to be reduced by an  
6             increase of said second portion and to be increased by a  
7             reduction of said second portion, whereby an adjustment of  
8             said adjusting element adjusts said third portion of said  
9             total contact force exerted by said brush roller on the  
10            floor.

1     **3.**     The floor cleaning tool according to claim 1, wherein said  
2             support element comprises at least one support roller that  
3             is rotatably mounted about a rotation axis that is fixed in  
4             said housing.

1     **4.**     The floor cleaning tool according to claim 1, wherein said  
2             support element comprises at least one supporting glide  
3             element that is fixed to said housing.

1     **5.**     The floor cleaning tool according to claim 1, wherein said  
2             adjusting element comprises at least one adjusting roller  
3             that is rotatably connected to said mounting point on said  
4             pivot lever.

1     **6.**     The floor cleaning tool according to claim 1, wherein said  
2             adjusting element comprises at least one adjusting glide

3 element that is non-rotatably connected to said mounting  
4 point on said pivot lever.

1 7. The floor cleaning tool according to claim 1, wherein said  
2 brush roller is rotatably mounted about a rotation axis  
3 that is fixed in said housing.

1 8. The floor cleaning tool according to claim 1, wherein said  
2 adjusting element is located between said brush roller and  
3 said support element, and closer to said brush roller than  
4 to said support element.

1 9. The floor cleaning tool according to claim 1, wherein said  
2 pivot point is at a pivoted end of said pivot lever.

1 10. The floor cleaning tool according to claim 9, wherein said  
2 spring connection point is at a free end of said pivot  
3 lever opposite and away from said pivoted end.

1 11. The floor cleaning tool according to claim 1, wherein said  
2 mounting point at which said adjusting element is connected  
3 to said pivot lever is between said pivot point and said  
4 spring connection point.

1 12. The floor cleaning tool according to claim 1, wherein said  
2 pivot lever is an angled two-armed lever including first  
3 and second arms connected to each other at a vertex with an  
4 angle less than 180° between said first and second arms,

5 and wherein said mounting point at which said adjusting  
6 element is connected to said pivot lever is located at said  
7 vertex.

1 13. The floor cleaning tool according to claim 1, further  
2 comprising an adjustable travel-limiting element that  
3 includes an adjustable counter-surface arranged in said  
4 housing adjacent to and cooperating with said pivot lever,  
5 and that is manually adjustable so as to selectively  
6 position said adjustable counter-surface at a selected  
7 position to limit an upward pivoting travel of said pivot  
8 lever against said adjustable counter-surface at said  
9 selected position.

1 14. The floor cleaning tool according to claim 13, wherein said  
2 travel-limiting element further includes a rotary knob that  
3 is rotatable about a knob rotation axis, wherein said  
4 adjustable counter-surface comprises plural stop surfaces  
5 that are connected to said rotary knob, and that extend  
6 parallel to said knob rotation axis, and that are  
7 respectively positioned at respective different spacing  
8 distances relative to said knob rotation axis, and wherein  
9 said different spacing distances define different positions  
10 of said plural stop surfaces among which said selected  
11 position is selected by rotation of said rotary knob.

1 15. The floor cleaning tool according to claim 1, further  
2 comprising an operating element and a coupling link that is

3 connected to said operating element and to said pivot lever  
4 at a location displaced from said pivot point, whereby an  
5 operating movement of said operating element operates said  
6 coupling link to pivot said pivot lever so as to  
7 selectively move said adjusting element out of said housing  
8 to a maximally protruding position thereof which maximizes  
9 said second portion of the total contact force of said  
10 floor cleaning tool on the floor and lifts said brush  
11 roller out of contact with the floor into a parking  
12 position of said brush roller.

1 **16.** The floor cleaning tool according to claim 15, wherein said  
2 coupling link comprises a coupling rod that is  
3 form-fittingly connected to said pivot lever.

1 **17.** The floor cleaning tool according to claim 15, wherein said  
2 coupling link comprises a spring-loaded extensible rod or  
3 piston-cylinder element.

1 **18.** The floor cleaning tool according to claim 15, wherein said  
2 biasing spring is connected to said coupling link and via  
3 said coupling link to said spring connection point on said  
4 pivot lever.